ABSTRACT OF THE DISCLOSURE

The modem relay provides a local interface to the modem on both ends of a call, demodulates the full duplex data stream, packetizes the bits for transport over an IP network, and remodulates the data stream at the remote end. The modem relay negotiates a best supported rate and modulation. If no common rate and modulation is supported by the modems at each end of the communication, the modem relay components will establish independent connections to the modems at each end and transmit the information across the packet network . The modem data stream can also be transported in a redundant fashion, which allows for seamless error recovery in the event of single or double packet loss events. Since the data stream can be completely recovered after packet loss, the remote modem is able to recreate the local modem's transmission exactly.